

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Application of: HART et al.

Serial No.: 10/559,758

Art Unit: (not yet assigned)

Filed: December 6, 2005

Entitled: PEPTIDE LIGANDS

Examiner: (not yet assigned)

U.S. national phase of PCT/GB2004/002421

Atty. Docket No.: ABL-012.1P US

**Mail Stop PCT**

Commissioner for Patents

P.O. Box 1450

Arlington, Virginia 22313-1450

**TRANSMITTAL LETTER and PETITION FOR EXTENSION OF TIME**

Sir:

Transmitted herewith are: [X] a Response to Notification of Missing Requirements (3 pages), [X] a copy of the Notification of Missing Requirements (2 pages), [X] a Replacement Sequence Listing (23 pages), [X] computer readable form (CRF) with [X] a Statement under 37 CFR 1.821-1825 (2 pages), [X] Copies of an already filed executed Combined Declaration Power of Attorney, second PTO Form 1390, date-stamped postcard, and transmittal (8 pages), [X] a Check for \$60.00 (check no. 6976), and [X] a Return Receipt post card, for filing in the above-identified patent application.

**FEE FOR ADDITIONAL CLAIMS**

[X] A fee for additional claims is not required.

[ ] A fee for additional claims is required. The additional fee has been calculated as shown below:

	CLAIMS REMAINING AFTER AMENDMENT	HIGHEST NUMBER PREVIOUSLY PAID FOR	NUMBER OF EXCESS CLAIMS	RATE (small entity)	FEES DUE
TOTAL CLAIMS	--	--	0	× \$25	= 0.00
INDEPENDENT	--	--	0	× \$100	= 0.00
FIRST INTRODUCTION OF MULTIPLE DEPENDENT CLAIM				+ \$180	= 0.00
<b>TOTAL FEES DUE</b>					<b>= 0.00</b>

[X] Small entity status has already been established for Applicant(s) in this case.

06/07/2006 MKAYPAGH 00000110 10559758

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60.00 OP

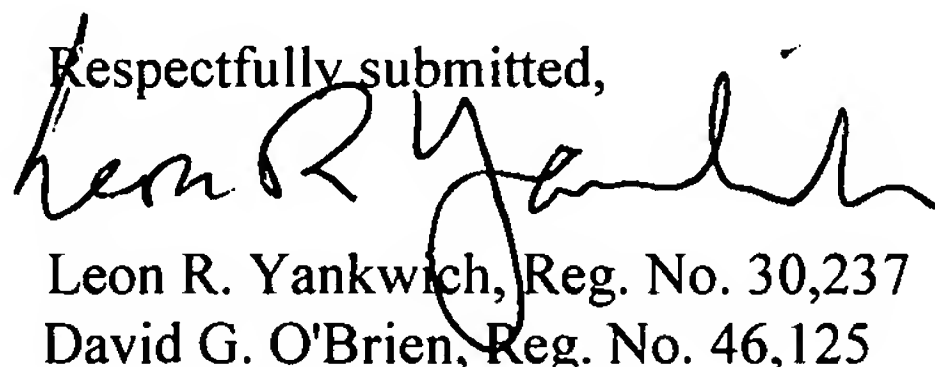
PAYMENT OF ADDITIONAL FEES

- ☐ A check in the amount of \$\_\_\_\_\_ in payment of the fee for filing an oath or declaration under 37 CFR §1.16(e) is transmitted herewith.
- ☒ The Commissioner is hereby authorized to charge payment of any additional fees required under 37 CFR §1.16 or §1.17 in connection with the paper(s) transmitted herewith, or to credit any overpayment of same, to Deposit Account No. 50-0268. A duplicate copy of this transmittal letter is transmitted herewith.

PETITION FOR EXTENSION OF TIME

- ☒ Extension is requested under 37 CFR 1.136(a), and the following extension fee is applicable for the paper(s) filed herewith: ☒ **\$60.00 for response within first month pursuant to 37 CFR 1.17(a)(1);**  
☐ \$225.00 for response within second month pursuant to 37 CFR 1.17(a)(2);  
☐ \$510.00 for response within third month pursuant to 37 CFR 1.17(a)(3);  
☐ \$795.00 for response within fourth month pursuant to 37 CFR 1.17(a)(4);  
☐ \$1080.00 for response within fifth month pursuant to 37 CFR 1.17(a)(5);
- ☒ A check including the amount of \$60.00 in payment of the extension fee is transmitted herewith. (check no. 6976)
- ☒ The Commissioner is hereby authorized to charge payment of any additional fees required in connection with the paper(s) transmitted herewith, or to credit any overpayment of same, to Deposit Account No. 50-0268. A duplicate of this transmittal letter is transmitted herewith.

Respectfully submitted,



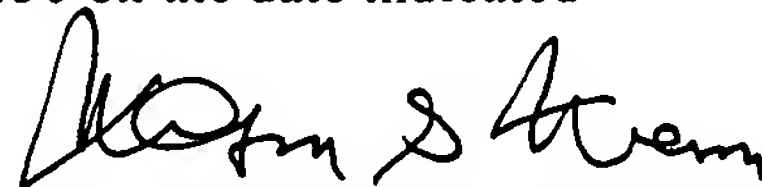
Leon R. Yankwich, Reg. No. 30,237  
David G. O'Brien, Reg. No. 46,125  
Attorney for Applicants  
YANKWICH & ASSOCIATES, P.C.  
201 Broadway  
Cambridge, Massachusetts 02139  
telephone: (617) 374-3700  
telefax: (617) 374-0055

**CERTIFICATE OF MAILING**

The undersigned hereby certifies that this correspondence and accompanying documents are being deposited with the U.S. Postal Service as First Class Mail, postage, prepaid, in an envelope addressed to: **Mail Stop PCT**, Commissioner for Patents, P.O. Box 1450, Arlington, Virginia 22313-1450 on the date indicated

May 30, 2006

date of mailing and signature



Nasim G. Memon

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re Application of: HART et al.

Serial No.: 10/559,758

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U.S. national phase of PCT/GB2004/002421

Attorney Docket No.: ABL-012.1P US

**Mail Stop PCT**

Commissioner for Patents

P.O. Box 1450

Alexandria, VA 22313-1450

**RESPONSE TO NOTIFICATION OF MISSING REQUIREMENTS  
UNDER 35 U.S.C. § 371**

Sir:

In response to a Notification of Missing Requirements mailed on March 10, 2006 and to complete the requirements for acceptance under 35 U.S.C. § 371, Applicants submit herewith a replacement Sequence Listing paper copy and CRF in compliance with 37 CFR §§1.821 et seq. and a copy of the earlier filed executed Declaration/Power of Attorney. This paper is accompanied by a copy of the Notification of Missing Requirements and a petition and fee for a one-month extension of time. Any additional fees deemed to be required to complete the filing formalities under 35 U.S.C. § 371 may be charged to USPTO Deposit Account No. 50-0268.

**REPLACEMENT SEQUENCE LISTING AND COMPUTER READABLE FORM**

In the Notification mailed March 10, 2006, Applicants were required to provide a replacement Sequence Listing which corrected errors set forth in a Raw Sequence Listing Error Report that accompanied the Notification. Specifically, the entry "peptide ligand" in field <223> was deemed not to conform to §1.823 in that the source of the genetic material was not sufficiently explained.

Applicants point out that no genetic material is set forth in the Sequence Listing. Rather, all the sequences set forth in the Sequence Listing are synthetic polypeptides which have binding properties of interest. Applicants have prepared a replacement Sequence Listing paper copy and computer readable

form on diskette in which the value in field <223> provided in connection with each sequence has been changed to be more descriptive of the polypeptide sequence listed. It is submitted that the replacement Sequence Listing filed herewith conforms to the regulations set forth in 37 CFR §§1.821 et seq., and accordingly entry of the replacement Sequence Listing in satisfaction of the remaining formal requirements for entry into the national phase is requested.

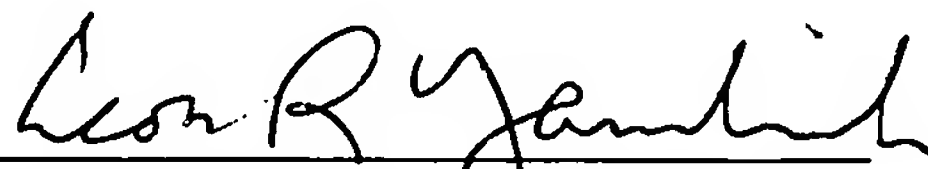
The specific sequences of SEQ ID NOS: 1-50 in the replacement Sequence Listing sheets 1-23 are identical to those in the originally filed Sequence Listing and no sequence information has been changed. Thus, no new matter has been added to the Sequence Listing, and the Sequence Listing provided herewith does not go beyond the disclosure of the originally filed application. Additionally, the Sequence Listing paper copy and the CRF submitted herewith are identical in content.

#### COPY OF EXECUTED DECLARATION/POWER OF ATTORNEY

The Notification of March 10, 2006 further required Applicants to submit an executed inventors' declaration. Such executed inventors' declaration was previously filed as a second submission under 35 U.S.C. § 371 on March 3, 2006. Evidently this submission had not become part of Applicants' file prior to the mailing of the Notification. Applicants submit herewith a copy of the executed Declaration/Power of Attorney as filed on March 3, 2006.

All formal requirements for national phase entry are believed to have been met by Applicants, and therefore issuance of an official filing receipt is respectfully requested.

Respectfully submitted,



Leon R. Yankwich, Reg. No. 30,237  
David G. O'Brien, Reg. No. 46,125  
Attorney(s) for Applicants  
Yankwich & Associates, P.C.  
201 Broadway  
Cambridge, MA 02139  
telephone: (617) 374-3700  
telefax: (617) 374-0055

**CERTIFICATE OF MAILING**

The undersigned hereby certifies that this correspondence and accompanying documents are being deposited with the U.S. Postal Service as First Class Mail, in an envelope addressed to **Mail Stop PCT**, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on the date indicated below.

May 30, 2006

Date of mailing and signature

Nasim G. Memon

Nasim G. Memon

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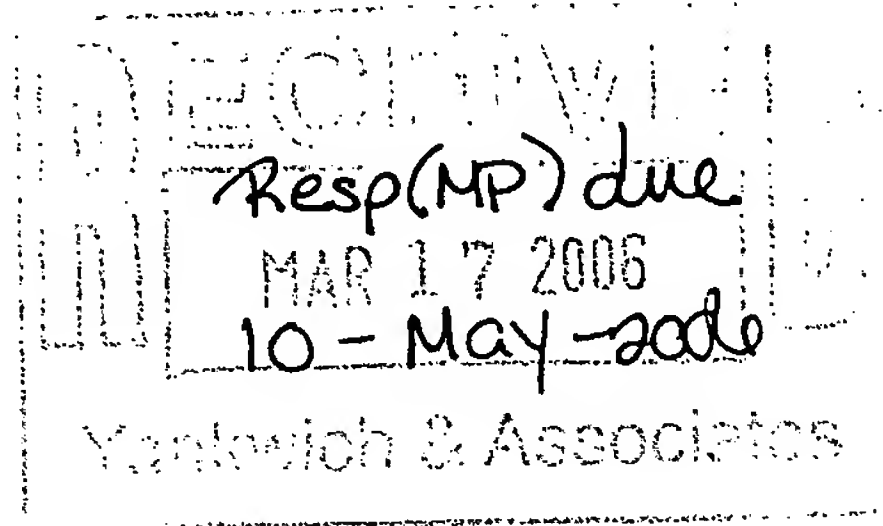


## UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

U.S. APPLICATION NUMBER NO.	FIRST NAMED APPLICANT	ATTY. DOCKET NO.
10/559,758	Stephen L Hart	ABL-012.1P US

Leon R Yankwich  
Yankwich & Associates  
201 Broadway  
Cambridge, MA 02139



INTERNATIONAL APPLICATION NO.	
PCT/GB04/02421	
I.A. FILING DATE	PRIORITY DATE
06/07/2004	06/06/2003

CONFIRMATION NO. 1570

## 371 FORMALITIES LETTER



\*OC000000018213066\*

Date Mailed: 03/10/2006

### NOTIFICATION OF MISSING REQUIREMENTS UNDER 35 U.S.C. 371 IN THE UNITED STATES DESIGNATED/ELECTED OFFICE (DO/EO/US)

The following items have been submitted by the applicant or the IB to the United States Patent and Trademark Office as a Designated / Elected Office (37 CFR 1.495).

- Indication of Small Entity Status
- Copy of the International Application filed on 12/06/2005
- Copy of the International Search Report filed on 12/06/2005
- Copy of IPE Report filed on 12/06/2005
- Preliminary Amendments filed on 12/06/2005
- Biochemical Sequence Diskette filed on 12/06/2005
- Oath or Declaration filed on 12/06/2005
- Biochemical Sequence Listing filed on 12/06/2005
- Request for Immediate Examination filed on 12/06/2005
- U.S. Basic National Fees filed on 12/06/2005
- Priority Documents filed on 12/06/2005
- Specification filed on 12/06/2005
- Claims filed on 12/06/2005
- Drawings filed on 12/06/2005
- Paper nucleotide sequence listings filed on 12/06/2005

The applicant needs to satisfy supplemental fees problems indicated below.

The following items **MUST** be furnished within the period set forth below in order to complete the requirements for acceptance under 35 U.S.C. 371:

- Oath or declaration of the inventors, in compliance with 37 CFR 1.497(a) and (b), identifying the application by the International application number and international filing date. The current oath or declaration does not comply with 37 CFR 1.497(a) and (b) in that it:
  - is not executed in accordance with either 37 CFR 1.66 or 37 CFR 1.68.



- To avoid abandonment, a surcharge (for late submission of filing fee, search fee, examination fee or oath or declaration) as set forth in 37 CFR 1.492(h) of \$65 for a small entity in compliance with 37 CFR 1.27, must be submitted with the missing items identified in this letter.

#### SUMMARY OF FEES DUE:

Total additional fees required for this application is \$65 for a Small Entity:

- \$65 Surcharge.
- A copy of the "Sequence Listing" in computer readable form has been submitted. However, the content of the computer readable form does not comply with the requirements of 37 CFR 1.822 and/or 1.823, as indicated on the attached copy of the marked -up "Raw Sequence Listing." Applicant must provide a substitute computer readable form (CRF) copy of the "Sequence Listing" and a statement that the content of the sequence listing information recorded in computer readable form is identical to the written (on paper or compact disc) sequence listing and, where applicable, includes no new matter, as required by 37 CFR 1.821(e), 1.821(f), 1.821(g), 1.825(b), or 1.825(d).

Applicant is cautioned that correction of the above items may cause the specification and drawings page count to exceed 100 pages. If the specification and drawings exceed 100 pages, applicant will need to submit the required application size fee.

For questions regarding compliance to 37 CFR 1.821-1.825 requirements, please contact:

- For Rules Interpretation, call (571) 272-0951
- For Patentin Software Program Help, call Patent EBC at 1-866-217-9197 or directly at 703-305-3028 / 703-308-6845 between the hours of 6 a.m. and 12 midnight, Monday through Friday, EST.
- Send e-mail correspondence for Patentin Software Program Help @ [ebc@uspto.gov](mailto:ebc@uspto.gov)

**ALL OF THE ITEMS SET FORTH ABOVE MUST BE SUBMITTED WITHIN TWO (2) MONTHS FROM THE DATE OF THIS NOTICE OR BY 32 MONTHS FROM THE PRIORITY DATE FOR THE APPLICATION, WHICHEVER IS LATER. FAILURE TO PROPERLY RESPOND WILL RESULT IN ABANDONMENT.**

The time period set above may be extended by filing a petition and fee for extension of time under the provisions of 37 CFR 1.136(a).

Applicant is reminded that any communications to the United States Patent and Trademark Office must be mailed to the address given in the heading and include the U.S. application no. shown above (37 CFR 1.5)

*A copy of this notice **MUST** be returned with the response.*

JOHN L ANDERSON

Telephone: (703) 308-9140 EXT 211

#### PART 1 - ATTORNEY/APPLICANT COPY

U.S. APPLICATION NUMBER NO.	INTERNATIONAL APPLICATION NO.	ATTY. DOCKET NO.
10/559,758	PCT/GB04/02421	ABL-012.1P US

**PATENT COOPERATION TREATY  
IN THE UNITED STATES DESIGNATED/ELECTED OFFICE**

Application of: HART et al.

Serial No.: 10/559,758

Filed: December 6, 2005

Entitled: PEPTIDE LIGANDS

Art Unit: (not yet assigned)

Examiner: (not yet assigned)

U.S. national phase of Int'l Appln. PCT/GB2004/002421 filed June 7, 2004, designating the U.S.  
Atty. Docket No.: ABL-012.1P US

Mail Stop PCT  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

**TRANSMITTAL**

1. Designated/Elected Office (DO/EO/US) Transmittal Form PTO-1390 (3 pages);
2. Duplicate copies Transmittal Form PTO-1390 pages 2 and 3 - fee calculation/authorization;
3. Executed Oath/Declaration and Power of Attorney (3 pages);
4. Return Receipt Postcard.

Respectfully submitted,

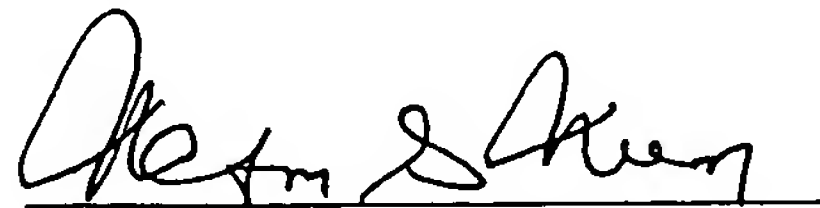
Leon R. Yankwich, Reg. No. 30,237  
David G. O'Brien, Reg. No. 46,125  
Attorneys for Applicants  
YANKWICH & ASSOCIATES, P.C.  
201 Broadway  
Cambridge, Massachusetts 02139  
telephone: 617-374-3700  
telecopier: 617-374-0055

**CERTIFICATE OF MAILING**

The undersigned hereby certifies that this correspondence and additional papers listed above are being deposited with the United States Postal Service as First Class Mail, postage prepaid, in an envelope addressed to the Mail Stop PCT, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date indicated below.

March 1, 2006

Date

  
Nasim G. Memon



<b>TRANSMITTAL LETTER TO THE UNITED STATES DESIGNATED/ELECTED OFFICE (DO/EO/US) CONCERNING A SUBMISSION UNDER 35 U.S.C. 371</b>		ATTORNEY'S DOCKET NUMBER <b>ABL-012.1P US</b>
INTERNATIONAL APPLICATION NO. <b>PCT/GB2004/002421</b>	INTERNATIONAL FILING DATE <b>June 7, 2004</b>	U.S. APPLICATION NO. (If known, see 37 CFR 1.5) <b>10/559,758</b>
TITLE OF INVENTION <div style="text-align: center;"><b>PEPTIDE LIGANDS</b></div>		
APPLICANT(S) FOR DO/EO/US <div style="text-align: center;"><b>Stephen L. HART; Michele WRITER</b></div>		
Applicant herewith submits to the United States Designated/Elected Office (DO/EO/US) the following items and other information:		
1. <input type="checkbox"/> This is a <b>FIRST</b> submission of items concerning a submission under 35 U.S.C. 371.		
2. <input checked="" type="checkbox"/> This is a <b>SECOND</b> or <b>SUBSEQUENT</b> submission of items concerning a submission under 35 U.S.C. 371.		
3. <input type="checkbox"/> This is an express request to begin national examination procedures (35 U.S.C. 371(f)). The submission must include items (5), (6), (9) and (21) indicated below.		
4. <input type="checkbox"/> The US has been elected (Article 31).		
5. <input type="checkbox"/> A copy of the International Application as filed (35 U.S.C. 371(c)(2)) <div style="margin-left: 20px;">           a. <input type="checkbox"/> is attached hereto (required only if not communicated by the International Bureau).            b. <input type="checkbox"/> has been communicated by the International Bureau.            c. <input type="checkbox"/> is not required, as the application was filed in the United States Receiving Office (RO/US).         </div>		
6. <input type="checkbox"/> An English language translation of the International Application as filed (35 U.S.C. 371(c)(2)). <div style="margin-left: 20px;">           a. <input type="checkbox"/> is attached hereto.            b. <input type="checkbox"/> has been previously submitted under 35 U.S.C. 154(d)(4).         </div>		
7. <input type="checkbox"/> Amendments to the claims of the International Application under PCT Article 19 (35 U.S.C. 371(c)(3)) <div style="margin-left: 20px;">           a. <input type="checkbox"/> are attached hereto (required only if not communicated by the International Bureau).            b. <input type="checkbox"/> have been communicated by the International Bureau.            c. <input type="checkbox"/> have not been made; however, the time limit for making such amendments has NOT expired.            d. <input type="checkbox"/> have not been made and will not be made.         </div>		
8. <input type="checkbox"/> An English language translation of the amendments to the claims under PCT Article 19 (35 U.S.C. 371(c)(3)).		
9. <input checked="" type="checkbox"/> An oath or declaration of the inventor(s) (35 U.S.C. 371(c)(4)). (Executed)		
10. <input type="checkbox"/> An English language translation of the annexes of the International Preliminary Examination Report under PCT Article 36 (35 U.S.C. 371(c)(5)).		
<b>Items 11 to 20 below concern document(s) or information included:</b>		
11. <input type="checkbox"/> An Information Disclosure Statement under 37 CFR 1.97 and 1.98.		
12. <input type="checkbox"/> An assignment document for recording. A separate cover sheet in compliance with 37 CFR 3.28 and 3.31 is included.		
13. <input checked="" type="checkbox"/> A preliminary amendment.		
14. <input type="checkbox"/> An Application Data Sheet under 37 CFR 1.76.		
15. <input type="checkbox"/> A substitute specification.		
16. <input checked="" type="checkbox"/> A power of attorney and/or change of address letter. (Executed)		
17. <input checked="" type="checkbox"/> A computer-readable form of the sequence listing in accordance with PCT Rule 13ter.2 and 37 CFR 1.821- 1.825.		
18. <input type="checkbox"/> A second copy of the published International Application under 35 U.S.C. 154(d)(4).		
19. <input type="checkbox"/> A second copy of the English language translation of the international application under 35 U.S.C. 154(d)(4).		

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

U.S. APPLICATION NO. (if known, see 37 CFR 1.5) <b>10/559,758</b>	INTERNATIONAL APPLICATION NO. <b>PCT/GB2004/002421</b>	ATTORNEY'S DOCKET NUMBER <b>ABL-012.1P US</b>
20. Other items or information:		
The following fees have been submitted		<b>CALCULATIONS</b>
21. <input type="checkbox"/> Basic national fee (37 CFR 1.492(a))..... \$300		\$
22. <input type="checkbox"/> Examination fee (37 CFR 1.492(c))		\$
If the written opinion prepared by ISA/US or the international preliminary examination report prepared by IPEA/US indicates all claims satisfy provisions of PCT Article 33(1)-(4)..... \$0		\$
All other situations.....\$200		\$
23. <input type="checkbox"/> Search fee (37 CFR 1.492(b))		\$
If the written opinion of the ISA/US or the International preliminary examination report prepared by IPEA/US indicates all claims satisfy provisions of PCT Article 33(1)-(4)..... \$0		\$
Search fee (37 CFR 1.445(a)(2)) has been paid on the international application to the USPTO as an International Searching Authority.....\$100		\$
International Search Report prepared by an ISA other than the US and provided to the Office or previously communicated to the US by the IB..... \$400		\$
All other situations.....\$500		\$
<b>TOTAL OF 21, 22 and 23 =</b>		\$
<input type="checkbox"/> Additional fee for specification and drawings filed in paper over 100 sheets (excluding sequence listing in compliance with 37 CFR 1.821(c) or (e) or computer program listing in an electronic medium) (37 CFR 1.492(j)). The fee is \$250 for each additional 50 sheets of paper or fraction thereof.		\$
Total Sheets	Extra Sheets	RATE
- 100 =	/50 =	x \$250
Surcharge of \$130.00 for furnishing any of the search fee, examination fee, or the oath or declaration after the date of commencement of the national stage (37 CFR 1.492(h)).		\$ 130.00
CLAIMS	NUMBER FILED	NUMBER EXTRA
Total claims	- 20 =	11
Independent claims	6 - 3 =	3
MULTIPLE DEPENDENT CLAIM(S) (if applicable)		+ \$360
<b>TOTAL OF ABOVE CALCULATIONS =</b>		\$ 130.00
<input checked="" type="checkbox"/> Applicant claims small entity status. See 37 CFR 1.27. Fees above are reduced by 1/2.		\$
<b>SUBTOTAL =</b>		\$ 65.00
Processing fee of \$130.00 for furnishing the English translation later than 30 months from the earliest claimed priority date (37 CFR 1.492(i)).		\$
<b>TOTAL NATIONAL FEE =</b>		\$ 65.00
Fee for recording the enclosed assignment (37 CFR 1.21(h)). The assignment must be accompanied by an appropriate cover sheet (37 CFR 3.28, 3.31). \$40.00 per property		\$ 0
<b>TOTAL FEES ENCLOSED =</b>		\$ 65.00
		Amount to be refunded:
		\$ 65.00

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

- a. ☐ A check in the amount of \$ \_\_\_\_\_ to cover the above fees is enclosed.
- b. ☒ Please charge my Deposit Account No. 50-0268 in the amount of \$ 65.00 to cover the above fees.  
A duplicate copy of this sheet is enclosed.
- c. ☒ The Commissioner is hereby authorized to charge any additional fees which may be required, or credit any overpayment to Deposit Account No. 50-0268. A duplicate copy of this sheet is enclosed.
- d. ☐ Fees are to be charged to a credit card. **WARNING:** Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.

NOTE: Where an appropriate time limit under 37 CFR 1.495 has not been met, a petition to revive (37 CFR 1.137(a) or (b)) must be filed and granted to restore the International Application to pending status.

SEND ALL CORRESPONDENCE TO:

Leon R. Yankwich, Esq.  
YANKWICH & ASSOCIATES, P.C.  
201 Broadway  
Cambridge, MA 02139

  
SIGNATURE

David G. O'Brien

NAME

46,125

REGISTRATION NUMBER

March 1, 2006

Case No. ABL-012.1P US  
Applicant(s): HART et al.

Serial No. 10/559,758

Return of this post card, properly stamped, will signify safe receipt in the US Patent & Trademark Office of the following:

- ☒ Form PTO-1390 Transmittal Letter (3 pages)
- ☒ Fee transmittal - copies of pages 2 and 3
- ☒ Transmittal (1 page)
- ☒ Executed Combined Declaration/Power of Attorney (3 Pages)

*Filed via First Class Mail on March 1, 2006*

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**USPTO Rec'd PCT/PTO 03 MAR 2006**

Case No. ABL-012.1P US  
Applicant(s): HART et al.

Serial No. 10/559,758

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